

In the Claims:

1-17. (Cancelled).

18. (New) An insulating glass unit, comprising:
at least two glass panes,
a fastener for fixing the position of the glass panes, and
a sealing element for setting a distance between the glass panes and for gas-tight lateral insulation of an intermediate space located between the glass panes, the sealing element containing at least a gas-tight middle part and two lateral gap seals, each of which is situated in an area between one of the glass panes and the middle part,
wherein at least one diffusion-tight cushion presses directly against each of the two gap seals, and is situated directly adjoining the middle part.

19. (New) The insulating glass unit according to Claim 18, wherein the at least one diffusion-tight cushion comprises a respective diffusion-tight cushion between each of the two gap seals and the middle part of the sealing element and directly adjoins the at least one gap seal and the middle part .

20. (New) The insulating glass unit according to claims 18, wherein the cushion is essentially made of a material which has a Shore-A hardness according to DIN 53505 in the range of 50 N/mm² to 70 N/mm².

21. (New) The insulating glass unit according to claim 18, wherein the cushion is essentially made of an elastomeric plastic from the group consisting of EPDM, polyurethane, an acrylonitrile butadiene elastomer, a chlorobutadiene elastomeric, a fluoroelastomer, and a silicone.

22. (New) The insulating glass unit according to claim 18, wherein the cushion is provided with a gas-tight layer on at least one surface

23. (New) The insulating glass unit according to claim 22, wherein the gas-tight layer is a metal layer.

24. (New) The insulating glass unit according to Claim 22, wherein the gas-tight layer is applied to a surface of the cushion facing toward the intermediate space.

25. (New) The insulating glass unit claim 18, wherein the at least one cushion is has been extruded onto the middle part.

26. (New) The insulating glass unit according to claim 18, wherein the gap seal is made of a synthetic, elastomeric plastic.

27. (New) The insulating glass unit according to claim 18, wherein the synthetic, elastomeric plastic is polyisobutylene.

28. (New) The insulating glass unit according to claim 18, wherein each of the gap seals at least partially lies in a trough at a respective side of the sealing element facing toward the respective glass pane.

29. (New) The insulating glass unit according to claim 28, wherein the cushion comprises two profiled strips situated neighboring one another, and wherein the trough is defined between them.

30. (New) The insulating glass unit according to claim 18, wherein the middle part is a gas-tight hollow profile.

31. (New) The insulating glass unit according to claim 30, wherein the gas-tight hollow profile is made of metal and has a cavity in which a desiccant is located.

32. (New) The insulating glass unit according to claim 18, wherein the fastener comprises at least one clamp which externally encloses the glass panes and presses them against the sealing element.

33. (New) The insulating glass unit according to claim 18, wherein the at least one clamp is made of metal.

34. (New) The insulating glass unit according to Claim 32, wherein the clamp encloses the entire outer edge of the insulating glass unit.

35. (New) The insulating glass unit according to claim 32, wherein the clamp has a U-shaped cross-section with two leg sides which press on the glass panes, the two leg sides being connected by a front side.

36. (New) The insulating glass unit according to claim 35, wherein at least one of the leg sides of the clamp has at least one bulge directed toward the respective pane.

37. (New) The insulating glass unit according to claim 35, wherein the clamp has at least one bulge on its front side.

38. (New) The insulating glass unit according to claim 32, wherein the at least one fastener is comprised of multiple clamps and a tension band, the tension band being guided on the clamps around the edges of the glass panes and tensioned.

39. (New) The insulating glass unit according to claim 35, wherein the at least one fastener is comprised of multiple clamps and a tension band, the tension band being guided around the edges of the glass panes and tensioned in bulges on the front side of the clamps.